Ехнівіт Ј

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1 2 3	FOR	CAL-MAINE:	Mr. Robert Sanders Attorney at Law 2000 AmSouth Plaza P. O. Box 23059 Jackson, MS 39225 (Via phone)
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5 6	FOR	WILLOW BROOK:	Ms. Jennifer Griffin Attorney at Law
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analysis in this case?
 1
            Yes, I do.
 2
             Okay. Do you agree, Dr. Olsen, that the
 3
 4
      scientific method -- you're familiar with the
      scientific method; correct?
                                                                      10:26AM
 5
            Yes, sir.
 6
             Okay. Do you agree that the scientific method
 7
      required the Motley Rice experts to be open to the
 8
      conclusion that sources other than poultry were
 9
      responsible for the contamination alleged in this
                                                                     10:26AM
10
      case?
11
            Yes.
12
13
             Okay, and do you agree that to be
      scientifically defensible, it is important that
14
      CDM's sampling approach in this case be set up to
                                                                     10:26AM
15
      capture sufficient data to evaluate contamination
16
      from sources other than poultry litter?
17
            Yes.
18
             Okay, and you collected 89 edge of field
19
      samples in areas where you believed you would find
                                                                    10:26AM
20
      the impact of poultry waste; correct?
21
             That's both poultry and cattle waste. As we
22
      know, there's cattle on all those fields and so
23
      those were collected, any cattle waste that ran off
24
      of that field, too.
                                                                     10:27AM
25
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1	Q Let me back up the train for a second and make	
2	sure I understand. Are you telling the court, Dr.	
3	Olsen, that the contamination that you see in the	
4	edge of field samples, the 89 edge of field samples	
_	that you've listed under poultry on Table 6.4-2A	10:27AM
5		10:2/AM
6	could come from cattle as well as poultry?	
7	A There is potential that there's some cattle in	
8	it. It's in my opinion in my evaluations it's	
9	insignificant compared to poultry.	
10	Q How many of those 89 edge of field poultry	10:27AM
11	samples are also contaminated with waste from	
12	cattle?	
13	A I did not try to document that. I mean, we	
14	looked at the chemical contamination and verified	
15	that cattle contamination in runoff is distinct from	10:27AM
16	poultry contamination, and if the cattle	
17	contamination would have been there in a significant	
18	quantity, it's distinct enough we would have seen	
19	it. So that relates back to my opinion that we	
20	would have seen the impact of cattle waste based	10:28AM
21	upon the sampling that we did, both the edge of	
22	field and in the environment. If it's a major	
23	source, we would have picked it up.	
24	Q Well, did you see?	
25	A What's that?	10:28AM

1	Q Did you see it?
2	A We saw it in a few samples, but it was not
3	major enough to create its own distinct signature in
4	the basin.
5	Q Well, how many of the 89 samples did you see 10:28AM
6	the effects of cattle in your analysis?
7	A It was not dominant in any of those samples.
8	Q Was it present in all the samples?
9	A I don't know. I didn't look specifically, but
10	it wasn't a dominant signature that was created in 10:28AM
11	those runoff at all.
12	Q What do you mean by dominant?
13	A It wasn't the major composition of the waste
14	source at all. It wasn't identified as a major
15	component or signature component at all in those 10:29AM
16	edge of field samples.
17	Q What do you mean by major?
18	A Dominant, you know, scientifically it's
19	greater than 50 percent of composition, but these
20	compositions were you know, I never did try to 10:29AM
21	put a number with it, but based on my mass balance
22	calculations, we can go through there parameter by
23	parameter but, you know, for copper, it's going to
24	be a very minor percent. I think I calculated
25	typically less than 1 percent, if any, would be 10:29AM

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related to cattle, you know. There just isn't any
 1
      copper in cattle waste. The phosphorus, you know,
 2
      it may range from, you know, 10 to 15 percent in
 3
 4
      those samples, but in my opinion, that's an
      overestimate of how much phosphorus is really from
                                                                    10:29AM
 5
      the cattle in those waste samples.
 6
             So, you know, there's a whole section on my
 7
      evaluation of how much mass would actually be in
 8
      those types of samples, and that's why we did the
 9
      synthetic leachates, to try to figure that out, but
                                                                   10:30AM
10
      it was a very small fraction, you know, typically
11
      less than 10 percent, except for some of the
12
13
      bacteria. Those were higher. You know, those were
      in the 30 to 40 percent.
14
      Q Dr. Olsen, if you now concede that some of the 10:30AM
15
      edge of field samples are cross contaminated with
16
      cattle manure, then why did you portray them in
17
      Table 6.4-2A under the heading poultry edge of
18
      field?
19
               MR. PAGE: Object to the form.
                                                                    10:30AM
20
            I did not say they were cross contaminated. I
21
      said they were -- potentially contained some minor
22
      parts of cattle.
23
            How is that different from cross
24
      contamination?
                                                                    10:30AM
25
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1	A We didn't contaminate them we didn't cross	
2	contaminate them by any sampling procedure or	
3	anything at all. Cross contamination is usually	
4	related to a sampling procedure that you've added	
5	something that you weren't supposed so. In the	10:31AM
6	scientific literature, that's what cross	
7	contamination would be.	
8	Q Well, my question took us off track. Let me	
9	see if I can get us back where we were.	
10	A That's all right.	10:31AM
11	Q Dr. Olsen, you do concede that some of the	
12	edge of field samples on Table 6.4-2A that you have	
13	described as poultry contained concentrations of	
14	each or some of these parameters that actually	
15	derive from cattle manure?	10:31AM
16	A Potentially very small portions. Those are	
17	mostly poultry, and that's what was documented in	
18	the field. We did not try to document cattle on the	
19	field. I'm just saying there's a potential that	
20	some of that had minor parts of cattle in those	10:31AM
21	samples.	
22	Q So given that acknowledgment, Dr. Olsen, are	
23	the 89 edge of field samples that you've described	
24	as poultry representative of the impacts of just	
25	poultry or poultry and cattle?	10:32AM

1	A They're representative mostly of poultry.	
2	Some of them may have some cattle impact, but as I	
3	described in there and other experts have described,	
4	it's an extremely minor part of that contamination.	
5	Q All right. Dr. Olsen, with respect to Table	10:32AM
6	6.4-2 where you compare 89 edge of field samples	
7	that you have labeled as poultry with two cattle	
8	impacted edge of field samples, do you believe that	
9	that comparison is sufficiently robust to draw	
10	scientifically valid conclusions, 89 versus two?	10:32AM
11	A I did not make those types of comparison.	
12	This is just reporting the data.	
13	Q I believe you told me that Motley Rice first	
14	collected these two cattle edge of field samples in	
15	the spring of this year; is that right?	10:33AM
16	MR. PAGE: Object to the form.	
17	A I don't think Motley Rice collected these	
18	samples.	
19	Q Oh, thank you. I believe you told me that CDM	
20	personnel working under the direction of Motley Rice	10:33AM
21	collected the cattle edge of field samples in March	
22	of 2008; is that right?	
23	MR. PAGE: Object to the form.	
24	A Again, we weren't working under the direction	
25	of Motley Rice. You know, it was Lithochimeia	10:33AM